## FY 2000 Subsistence Fisheries Project Narrative Project #21

Project Title: Dall River Area Northern Pike Population Studies

**Investigator Organizations:** ADF&G Sport Fisheries Division, Stevens Village Natural Resource Program

Geographic Area: Yukon River

**Information Type:** Stock Status and Trends

**Issue Addressed:** Increased recreational use of northern pike near Stevens Village is a source of conflict with local residents who use the fish for subsistence. The cooperative development of a fisheries management plan with Stevens Village along with joint stock assessment efforts is considered the optimal path to address concerns in a long term manner.

## **Study Objectives:**

- 1. To estimate the size and age of northern pike inhabiting the Dall River and other Dall River tributaries in the Dall River Area.
- 2. To determine the proportion of pike that remain within the Dall River or move from other tributaries to the Dall River during the open water fishing season.

Project Description: In 1999 a cooperative project was initiated with the Stevens Village Natural Resource Program (SVNRP), the Alaska Department of Fish and Game (ADF&G), and the Yukon Flats National Wildlife Refuge (YFNWR) with an interim goal of developing a fisheries management plan for the Dall River area. Another management goal is the maintenance of quality northern pike fisheries for the mutual benefit of local and as appropriate non-local users. During 1999, ADF&G and SVNRP captured, measured and marked (320 with Floy tags and 42 with radio transmitters) northern pike in the Dall River drainage. The objectives were to determine the fidelity of pike to the Dall River during the fishing season and to estimate the proportion of adult pike in large size categories. All sampling and radio telemetry tracking objectives were attained by SVNRP and ADF&G field crews. YFNWF provided equipment and flights for aerial tracking. The FY2000 project would build on the 1999 stock assessment efforts. Information is needed on the degree to which pike spawning in other nearby Yukon River tributaries are vulnerable to exploitation in the Dall River fisheries. Radio telemetry will be used to determine rates of movement between tributaries. Northern pike will be measured, tagged and released to assess size and age composition of pike in the Dall River and in other nearby tributaries for comparison and to provide a benchmark for assessment of the effectiveness of management actions. This project will be designed, planned, reviewed, and executed according to the Division of Sport Fish's operational planning process (see Fisheries 18(2):6-12).

Consultations Completed / Potential for Capacity Building: During 1999 SVNRP provided personnel for the joint stock assessment project on the Dall River. In future seasons the role of SVNRP will include increasingly independent field work with the goal of building a stock monitoring program that is implemented by the SVNRP. ADFG will continue to provide technical support, review study designs, and assist in other ways as needed.

**Deliverables / Products:** Annual progress reports will be provided and a final report will be prepared detailing all study findings in the "Division of Sport Fisheries Data Series".

**Costs:** In FY2000 the project request will provide funding for staff and operational costs incurred by SVNRP and ADFG for project implementation, data analysis and report preparation.

Annual Budget Summary	ADF&G	SVNRP	Total
FY 2000	\$70.6 K	\$33.9 K	\$104.5 K